CIVIL TECH LABS

Accredited by **NABL** as per ISO/ IEC 17025 : 2005

5, 1st Cross, Srinivasa Colony, Mission Road, Bangalore - 560027

Ph: 080 - 4114 2867 / Mob. : 96862 31801, Email: civiltechlabs@gmail.com

T-2654

To,

Assistant Executive Engineer,
Yelahanka Satellite Sub Division,
BBMP.

01st April 2017

Dear Sir,

Sub: Testing of Materials.

As requested, tests on physical properties were carried out for the Materials supplied by you, for the work of **'Asphalting to roads and Improvements to drains in B Sector of ward no. 04.'**

Please find the enclosed Test Reports of the above.

Thanking You,
For Civil Tech Labs

Khushboo

CIVIL TECH LABS BANGALORE

(KHUSHBOO L.)
Quality Manager

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1/4

CIVIL TECH LABS

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TEST REPORT

TESTS ON REINFORCEMENT STEEL BAR 10mm

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of the Agency	M/s. Technical Manager (West), KRIDL
Date of Testing	01/04/2017
Grade of Steel	Fe - 500.

Sl.No.	Description	Result	IS 1786-2008 Min. Requirements	Remarks
1	Measured Diameter mm	10	10	Satisfactory
2	Wt/m Length (Kg/m)	0.618	0.617	Satisfactory
3	Bend & RebendTest	Pass	Should not Crack or Fracture	Satisfactory
4	Elongation (%)	13.8	12	Satisfactory
5	Yield Stress(N/Sq.mm)	507	500	Satisfactory
6	U T S (N/Sq.mm)	563	545	Satisfactory

Note:

1. The results relate only to the items tested.
2. Report shall not be reproduced except in full, without the written approval of the lab.
3. Any correction invalidates this report.
4. The results are based on the test conducted on samples supplied by the client.

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(KHUSHBOO L.)
Quality Manager

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TEST REPORT

TESTS ON REINFORCEMENT STEEL BAR 12 mm

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04
Name of the Agency	M/s. Technical Manager (West), KRIDL
Date of Testing	01/04/2017
Grade of Steel	Fe - 500.

Sl.No.	Description	Result	IS 1786-2008 Min. Requirements	Remarks
1	Measured Diameter mm	12	12	Satisfactory
2	Wt/m Length (Kg/m)	0.889	0.888	Satisfactory
3	Bend & RebendTest	Pass	Should not Crack or Fracture	Satisfactory
4	Elongation (%)	14.4	12	Satisfactory
5	Yield Stress(N/Sq.mm)	509	500	Satisfactory
6	U T S (N/Sq.mm)	566	545	Satisfactory

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TEST REPORT

GRADATION TEST ON COARSE AGGREGATES 40mm ↓ Graded

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of Agency	M/s. Technical Manager (West), KRIDL
Date of Testing	01/04/2017
Specific Gravity	**2.68**
Water Absorption	**0.29%**
Technical Reference	IS : 2386(Part I)–1963 (Reaffirmed 2011), IS : 2386 (Part III)–1963 (Reaffirmed 2011)

IS Sieve Designation (mm)	**Sieve Analysis (% Passing IS Sieve)**	**Grading Requirement as per IS:383-1970 (Reaffirmed 2011)**	**Remarks**
80	**100**	100	**Satisfies the requirement**
40	**98.4**	95-100	
20	**54.2**	30-70	
10	**24.5**	10-35	
4.75	**3.5**	0-5	

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TEST REPORT

GRADATION TEST ON FINE AGGREGATES

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of Agency	M/s. Technical Manager (West), KRIDL
Date of Testing	01/04/2017
Specific Gravity	2.58
Technical Reference	IS : 2386(Part I)-1963 (Reaffirmed 2011), IS : 2386 (Part III)-1963 (Reaffirmed 2011)

Sample	IS Sieve designation (mm)	Sieve Analysis (% Passing IS Sieve)	Grading Requirement as per IS:383-1970 (Reaffirmed 2011)				Grading Zone	Remarks
			ZONE-I	ZONE-II	ZONE-III	ZONE-IV		
River Sand	10	100	100	100	100	100	II	Satisfies the requirement
	4.75	97.4	90-100	90-100	90-100	95-100		
	2.36	85.4	60-95	75-100	85-100	95-100		
	1.18	75.4	30-70	55-90	75-100	90-100		
	0.6	48.8	15-34	35-59	60-79	80-100		
	0.3	25.9	5-20	8-30	12-40	15-50		
	0.15	7.8	0-10	0-10	0-10	0-15		

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TEST REPORT

TEST ON CEMENT

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of the Agency	M/s. Technical Manager (West), KRIDL
Date of Testing	01/04/2017

Tests	Test Method As Per IS & Apparatus		Results		Requirements As Per IS 8112:1989	Remarks
	IS Code	Method	Value	Unit		
Initial Setting Time	IS-4031 (Part-5) 1988	VICAT	48	min	Not Less Than 30 Minutes	Satisfies Requirement
Final Setting Time	IS-4031 (Part-5) 1988	VICAT	482	min	Not More Than 600 Minutes	Satisfies Requirement
Soundness	IS-4031 (Part-3) 1988	LE-CHATELIER	4	mm	Not More Than 10 mm	Satisfies Requirement

Note:

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T-2654

To,

Assistant Executive Engineer,
Yelahanka Satellite Sub Division,
BBMP.

02nd May 2017

Dear Sir,

Sub: Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Testing of cubes – Reg.

As requested the 28th day Compressive Strength Test of Cubes was carried out for the above work for the samples supplied by you.

Please find the enclosed Test Reports of the above.

Thanking you,

For Civil Tech Labs,

Khushboo

CIVIL TECH LABS BANGALORE

(KHUSHBOO L.)
Quality Manager

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TEST REPORT

COMPRESSIVE STRENGTH TEST ON CONCRETE CUBES

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of Agency	M/s. Technical Manager (West), KRIDL
Grade of Concrete	M-20
No. of cubes tested	3
Technical Reference	IS: 516-1959 (Reaffirmed 2013)

Sl. No.	ID	Dimension of specimen (mm)	Cross sectional area (mm^2)	Date of Casting	Date of Testing	Age at test (Days)	Weight (Kg)	Failure Load (KN)	Compressive Strength (N/mm^2)	Avg Compressive Strength (N/mm^2)
1	Sample-1	150.12 X 150.12 X 150.0	22536	02/04/2017	30/04/2017	28	8.16	480	21.33	21.78
2		150.03 X 150.14 X 150.0	22526				8.18	490	21.78	
3		150.17 X 150.15 X 150.0	22548				8.17	500	22.22	

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TEST REPORT

COMPRESSIVE STRENGTH TEST ON CONCRETE CUBES

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of Agency	M/s. Technical Manager (West), KRIDL
Grade of Concrete	M-20
No. of cubes tested	3
Technical Reference	IS: 516-1959 (Reaffirmed 2013)

Sl. No.	ID	Dimension of specimen (mm)	Cross sectional area (mm^2)	Date of Casting	Date of Testing	Age at test (Days)	Weight (Kg)	Failure Load (KN)	Compressive Strength (N/mm^2)	Avg Compressive Strength (N/mm^2)
1	Sample-2	150.13 X 150.12 X 150.0	22538	02/04/2017	30/04/2017	28	8.18	485	**21.56**	**21.85**
2		150.15 X 150.14 X 150.0	22544				8.20	490	**21.78**	
3		150.16 X 150.13 X 150.0	22544				8.22	500	**22.22**	

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TEST REPORT

COMPRESSIVE STRENGTH TEST ON CONCRETE CUBES

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of Agency	M/s. Technical Manager (West), KRIDL
Grade of Concrete	M-20
No. of cubes tested	3
Technical Reference	IS: 516-1959 (Reaffirmed 2013)

Sl. No.	ID	Dimension of specimen (mm)	Cross sectional area (mm^2)	Date of Casting	Date of Testing	Age at test (Days)	Weight (Kg)	Failure Load (KN)	Compressive Strength (N/mm^2)	Avg Compressive Strength (N/mm^2)
1	Sample-3	150.16 X 150.12 X 150.0	22542	02/04/2017	30/04/2017	28	8.16	495	22.00	22.22
2		150.14 X 150.15 X 150.0	22544				8.17	500	22.22	
3		150.16 X 150.12 X 150.0	22542				8.18	505	22.44	

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TEST REPORT

COMPRESSIVE STRENGTH TEST ON CONCRETE CUBES

Name & Address of the Customer	AEE, Yelahanka Satellite Sub Division, BBMP.
Name of Work	Asphalting to roads and Improvements to drains in B Sector of ward no. 04.
Name of Agency	M/s. Technical Manager (West), KRIDL
Grade of Concrete	M-20
No. of cubes tested	3
Technical Reference	IS: 516-1959 (Reaffirmed 2013)

Sl. No.	ID	Dimension of specimen (mm)	Cross sectional area (mm^2)	Date of Casting	Date of Testing	Age at test (Days)	Weight (Kg)	Failure Load (KN)	Compressive Strength (N/mm^2)	Avg Compressive Strength (N/mm^2)
1	Sample-4	150.15 X 150.12 X 150.0	22541	02/04/2017	30/04/2017	28	8.18	500	22.22	22.22
2		150.13 X 150.15 X 150.0	22542				8.19	495	22.00	
3		150.14 X 150.13 X 150.0	22541				8.20	505	22.44	

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Quality Manager

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